

## Case 3213

***Bothriurus alticola* Pocock, 1899 (Arachnida, Scorpiones): proposed precedence of the specific name over the subspecific name of *Cercophonius brachycentrus bivittatus* Thorell, 1877**

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**Abstract.** The purpose of this application under Articles 23.9.3 and 81.2.3 of the Code is to conserve the well known specific name of *Bothriurus alticola* Pocock, 1899 for a scorpion (family BOTHRIURIDAE) from Argentina by giving it precedence over the little used subspecific name *Cercophonius brachycentrus bivittatus* Thorell, 1877. Pocock's nominal species is the type of *Orobothriurus* Maury, 1976 — a genus currently including 10 species from Andean and sub-Andean localities in Argentina and Peru, most occurring at high altitude.

**Keywords.** Nomenclature; taxonomy; Arachnida; Scorpiones; BOTHRIURIDAE; *Urophonius*; *Orobothriurus*; *Cercophonius brachycentrus bivittatus*; *Bothriurus alticola*; Argentina.

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1. Thorell (1877a, p. 180) described the new species *Cercophonius brachycentrus* (currently placed in *Urophonius* Pocock, 1893) and followed it with a description of a juvenile specimen, which he denoted (p. 183) as a variety of the species, Var.  $\beta$ , *bivittatum* [recte *bivittatus*]. Thorell suggested that the specimen, which is deposited in the Naturhistoriska Riksmuseet in Stockholm, might represent a distinct species.

2. All contemporary authors ignored the variety and, for example, in their publications Thorell (1877b, 1878), Pocock (1893) and Kraepelin (1894, 1899) did not mention *bivittatus*. Mello-Leitão (1931, p. 100) was the first author to cite the taxon as a subspecies, *Urophonius brachycentrus bivittatus*. Thereafter, Mello-Leitão (1933, 1934, 1938, 1939, 1945) and Abalos (1959, 1963) cited the trinomen, in all cases either just as part of a list or in referring to Thorell's (1877a) description.

3. As part of a revision of *Urophonius brachycentrus*, Maury (1977, p. 148) was the first author to re-examine the type of *U. b. bivittatus*. Despite poor preservation of the single specimen (several legs had been lost), he was able to determine that it did not belong in the genus *Urophonius* but most probably represented a juvenile specimen of *Bothriurus alticola* Pocock, 1899 (p. 357, fig. 1), described from Mendoza in the high Andes of Argentina and the type species of *Orobothriurus* Maury, 1976 (p. 14) by original designation. Maury (1977), however, made no comment on the

valid name for the specimen. Subsequently, Acosta & Maury (1998) cited *U. b. bivittatus* as of doubtful status, whereas Lowe & Fet (2000) continued to list the subspecies as valid in *Urophonius*.

4. I have examined the type specimen (paras. 1 and 3 above) of *C. b. bivittatus* Thorell, 1877 and can confirm Maury's (1977) suggestion that it is a specimen of *Orobothriurus alticola* (Pocock, 1899). The names *bivittatus* and *alticola* are therefore synonyms and a strict following of priority would result in *bivittatus* becoming the valid name for the species currently known as *alticola*. This would threaten nomenclatural stability. Nearly all citations of the name *bivittatus* are either included in lists or just quote Thorell's (1877a) original description. No new material has ever been attributed to the taxon and those authors mentioning it have incorrectly cited it as a subspecies within *Urophonius* and not in the sense of the genus *Orobothriurus*. In other words, with the exception of Maury (1977), no author knew for certain what taxon the name *bivittatus* represented. In contrast, the original description of *Bothriurus alticola* by Pocock (1899) is good, based on an adult male and an adult female specimen deposited in The Natural History Museum, London, and includes a general illustration of the female (fig. 1). Maury's (1976) redescription of *alticola* was complete, with many illustrations of the type material. Lowe & Fet (2000, p. 35) listed 10 authors in 20 publications, with one exception (1911) dating from the 1930s onwards, as having adopted the name *alticola* for the species. In recent years in further revisionary work on *Orobothriurus*, I have consistently cited the species under this name (see Acosta & Ochoa, 2000, 2001; Ochoa & Acosta, 2002).

5. The type specimen of *Cercophonius brachycentrus bivittatus* Thorell, 1877 is a small juvenile and the taxonomic status of the species might be considered uncertain by some authors. Occurrences of species of *Orobothriurus* in Argentina are in high montane localities so that, at the present state of knowledge, the existence of further species cannot be discounted. I therefore propose that the name *Bothriurus alticola* Pocock, 1899 be given conditional precedence over *C. b. bivittatus*, in accordance with Article 81.2.3 of the Code. Commission approval will mean that if the two names are considered to be synonyms, *alticola* becomes the valid name for the taxon. The name *bivittatus* will remain available for use if taxonomically required for a species or subspecies distinct from *alticola*.

6. The International Commission on Zoological Nomenclature is accordingly asked:

- (1) to use its plenary power to give the name *alticola* Pocock, 1899, as published in the binomen *Bothriurus alticola*, precedence over the name *bivittatus* Thorell, 1877, as published in the trinomen *Cercophonius brachycentrus bivittatus*, whenever the two are considered to be synonyms;
- (2) to place on the Official List of Generic Names in Zoology the name *Orobothriurus* Maury, 1976 (gender: masculine), type species by original designation *Bothriurus alticola* Pocock, 1899;
- (3) to place on the Official List of Specific Names in Zoology the following names:
  - (a) *alticola* Pocock, 1899, as published in the binomen *Bothriurus alticola*, with the endorsement that it is to be given precedence over the name *bivittatus* Thorell, 1877, as published in the trinomen *Cercophonius brachycentrus bivittatus*, whenever the two are considered to be synonyms;

- (b) *bivittatus* Thorell, 1877, as published in the trinomen *Cercophonium brachycentrus bivittatus*, with the endorsement that it is not to be given priority over the name *alticola* Pocock, 1899, as published in the binomen *Bothriurus alticola*, whenever the two are considered to be synonyms.

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